The invention herein was made with Government support under Contract MDA972-95-C-0001 awarded by the Advanced Research Projects Agency (ARPA).

The Government has certain rights in this invention .--

In the claims:

Kindly cancel claims 1-10. Kindly add new claims 17-29 as follows:

17. In a star communication network comprising a hub node and comprising a plurality of links coupled to said hub node for carrying data in W channels along routes, a method of configuring said network comprising the steps of:

limiting said W channels to an even number;

dividing said W channels into a first group and a second group in each of said links;

connecting each channel of said first group of one of said links to one channel of said second group of each of said links other than said one link; and

assigning no more than W channels to the transmission of data along any of said links, whereby the efficiency of the configuring is improved.

- 18. A method, as claimed in claim 17, and further comprising the step of assigning said routes to said channels which traverse at most two of said links.
- 19. A method, as claimed in claim 17 wherein said step of connecting comprises the step of connecting each channel i = 0,1,..., W/2 1 of a first one of said links through said hub node to channel w(i) on each of said links other than said first link where w(i) = i + W/2.

20. A star communication network comprising in combination: a hub node; and

links coupled to said hub node for carrying data along routes in W channels divided into a first group and a second group where W is even, said hub node comprising switches connecting each channel of said first group of one of said links to one channel of said second group of each of said links other than said one link.

- 21. A network, as claimed in claim 20, wherein each said link comprises no more than W channels.
- 22. A network, as claimed in claim 20, wherein said routes traverse at most two of said links.
- 23. Apparatus, as claimed in claim 20, wherein each channel i = 0,1,..., W/2 1 of said one link is connected through said hub node to channel w(i) on all of said links other than said one link where w(i) = i + W/2.
- 24. In a star communication network comprising a hub node and comprising links coupled to said hub node for carrying data in W channels, a method of configuring said network comprising the steps of:

assigning no more than W channels to the transmission of data along any of said links; and

connecting each channel of a first one of said links to no more than two channels of a second one of said links through said hub node whereby the efficiency of the configuring is improved.

25. A star communication network comprising in combination:

a hub node; and

links coupled to said hub node for carrying data along routes in no more than W channels, said hub node comprising switches connecting each channel of a first one of said links to no more than two channels of a second one of said links through said hub node.

26. In a star communication network comprising a hub node and comprising links coupled to said hub node for carrying data in W channels, a method of configuring said network comprising the steps of:

assigning no more than W channels to the transmission of data along any of said links; and

connecting each channel of a first one of said links to no more than a second channel of a second one of said links through said hub node, where the second channel is different from the first channel of the second one of said links.

27. A star communication network comprising in combination:

a hub node; and

links coupled to said hub node for carrying data along routes in no more than W channels, said hub node comprising switches connecting each channel of a first one of said links to no more than a second channel of a second one of said links through said hub node, where the second channel is different from the first channel of the second one of said links.

28. \A method of proposing a star network comprising:

proposing a network comprising a hub node;

proposing links coupled to said hub node for carrying data along routes in W channels divided into a first group and a second group where W is even; and

proposing that said hub node comprise switches connecting each channel of said first group of one of said links to one channel of said second group of each of said links other than said one link.

29. A method of proposing a star communication network comprising:

proposing a hub node;

proposing links coupled to said hub node for carrying data along routes in no more than W channels; and

proposing that said hub node comprise switches connecting each channel of a first one of said links to no more than two channels of a second one of said links through said hub node.

REMARKS

This is a divisional application which presents the subject matter of claims 11-16 and 29-39 which were subject to a restriction requirement in the Office Action mailed Feb. 1, 1999 in the parent application. Claims 11-16 of this application are the same as original claims 11-16 of parent application. Claims 17-27 are the same as claims 29-39 added by amendment to the parent application. New claims 28-29, like allowed claim 43 of the parent application, are directed to a method of proposing a network. Such claims are allowable under the holding in *State Street Bank & Trust Co. vs. Signature Financial Group, Inc.*, 149 F.3d 1368 (Fed. Cir. 1998). In that case, the court laid to rest